TABLE OF CONTENTS

LIST OF TABLES

LIST OF FIGURES

LIST OF SYMBOLS

λ	-	Air to fuel ratio
Al	-	Aluminium
ANL	-	Argonne National Laboratory
ATR	-	Autothermal Reforming
C	-	Carbon
CO_2	-	Carbon Dioxide
CO	-	Carbon Monoxide
CSTR	-	Continuously Stirred Tank Reactor
^oC	-	degree Celcius
ft^3	-	cubic feet
g/L	-	gram per litre
$gmol^{-1}$	-	gram per mol
GHSV	-	Gas Hourly Space Velocity
h	-	hour
H	-	Hydrogen(atom)
HCs	-	Hydrocarbons
H_2	-	Hydrogen(molecule)
H_2O	-	Water
K	-	Kelvin
kJ mol^{-1}	-	kilo Joule per mol
kW	-	kilo Watt
LHSV	-	Liquid Hourly Space Velocity
LHV	-	Lower Heating Value
mol/h	-	mol per hour
m^3	-	cubic meter

m^3/h	-	cubic meter per hour
Ni	-	Nickel
O_2	-	Oxygen(molecule)
ODE	-	Ordinary Differential Equation
P	-	Pressure
PEMFC	-	Proton Exchange Membrane Fuel Cell
POX	-	Partial Oxidation
PROX	-	Preferential Oxidation
Ru	-	Ruthenium
RXNEQ	-	a thermodynamics equilibrium computer code developed by Haynes(1990)
S/C	-	Steam to carbon ratio
Si	-	Silica
SR	-	Steam-Reforming
STP	-	standard temperature and pressure [298.15 K and 101.325 kPa (1 atm)]
TOX	-	Total Oxidation
w	-	work
WGS	-	Water Gas Shift

LIST OF APPENDICES